

GHM
P.O. Box 160727
Austin, TX 78716-0727
972-240-5324
469-366-6731



Fax

To: Examiner Ben H. Liu	From: Jessica W. Smith
Fax: 571-270-4118	Pages: 7(including Fax Cover Sheet)
Phone:	Date: May 18, 2009
Re: 10/743,592	CC:

This communication has been transmitted by the Law Offices of Garlick Harrison & Markison (GHM), and may be confidential and/or privileged. If the reader of this message is not the intended recipient, you are hereby notified that any dissemination, distribution or copying of this communication is strictly prohibited. If you have received this communication in error, please immediately notify the sender by telephone at the number shown above.

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

Applicants:	Parker, et al.	Docket:	139215
Serial No.:	10/743,592	Art Unit:	2609
Filed:	December 22, 2003	Examiner:	Ben H. Liu
Title:	Wideband Cross-Connect System and Protection Method Utilizing SONET Add/Drop Multiplexers		

PROPOSED CLAIM AMENDMENTS

ATTN: Examiner Ben H. Liu

Commissioner for Patents
P. O. Box 1450
Alexandria, VA 22313-1450

Dear Examiner Liu,

Thank you very much for the phone conference on Friday, May 15, 2009 and Monday, May 18, 2009. Please find below new proposed claim amendments for your consideration.

Serial No.: 10/743,592

Examiner: Ben H. Liu

Amendment to the Claims

1 (Currently Amended). A WideBand cross-connect system comprising:

at least one SONET add/drop multiplexer being outfitted ~~so-as~~ to support SONET unidirectional, path-switched rings protection with Payload Defect Indicator - Path codes;

a working WideBand switch fabric coupled to said at least one SONET add/drop multiplexer, said working switch fabric receiving a working signal from a first interface on said at least one SONET add/drop multiplexer, ~~said working signal and working payload~~, said working switch fabric switching said working signal ~~so-as~~ to generate a working switched signal, monitoring for equipment failures that affect the working signal and to generate a working Payload Defect Indicator - Path code in response to monitoring for equipment failures and working switched payload, and providing said working switched signal to a second port on said at least one SONET add/drop multiplexer;

a protect WideBand switch fabric coupled to said at least one SONET add/drop multiplexer, said protect switch fabric receiving a protect signal from a third interface on said at least one SONET add/drop multiplexer, ~~said protect signal and protect payload~~, said protect switch fabric monitoring for equipment failures that affect the protect signal and switching said protect signal ~~so-as~~ to generate a protect switched signal and to generate a protect Payload Defect Indicator - Path code in response to monitoring for equipment failures and protect switched payload, and providing said protect switched signal to a fourth port on said at least one SONET add/drop multiplexer;

wherein said at least one SONET add/drop multiplexer operates as an input/output interface to the working and protect WideBand switch fabrics and selects between said working switched payload and said protect switched payload to send to a client based upon said working Payload Defect Indicator - Path code and said protect Payload Defect Indicator - Path code.

2 (Original). A WideBand cross-connect system as in claim 1, wherein said at least one SONET add/drop multiplexer comprises a single SONET add/drop multiplexer.

Serial No.: 10/743,392
Examiner: Ben H. Liu

3 (Original). A WideBand cross-connect system as in claim 1, wherein said at least one SONET add/drop multiplexer comprises a plurality of SONET add/drop multiplexers.

4 (Original). A WideBand cross-connect system as in claim 3, wherein said first port and said third port are on different SONET add/drop multiplexers of said plurality of SONET add/drop multiplexers.

5 (Currently Amended). A method of providing equipment protection in a cross-connect system comprising the steps of:

accepting an input client signal, said input client signal comprising payload, in at least one SONET add/drop multiplexer;

sending said payload to a working switch fabric from a first working signal interface of said SONET add/drop multiplexer and to a protect switch fabric from a first protect signal interface of said SONET add/drop multiplexer;

switching said payload in each of said working and protect switch fabrics; and

generating Payload Defect Indicator - Path codes in each of said working and protect switch fabrics in response to monitoring for equipment failures, wherein generating said Payload Defect Indicator - Path (PDI-P) codes in each of said working and protect switch fabrics, comprises:

monitoring by each of said working and protect switch fabrics for equipment failures;

in response to a detected equipment failure, generating PDI-P codes by the switch fabric detecting an equipment failure to signal a presence of the equipment failure;

transmitting switched payload and said generated Payload Defect Indicator - Path codes by the working switch interface to a second working signal interface of said SONET add/drop multiplexer and by the protect switch fabric to a second protect signal interface of said toward said at least one SONET add/drop multiplexer;

Serial No.: 10/743,592
Examiner: Ben H. Liu

receiving said switched payload and said Payload Defect Indicator - Path codes from each of said working and protect switch fabrics at said at least one SONET add/drop multiplexer; analyzing said Payload Defect Indicator - Path codes by said SONET add/drop multiplexer and selecting said switched payload from either said working or said protect switch fabric as a working client payload based upon said analysis.

6 (Previously Presented). The method of providing equipment protection as in claim 5, wherein said Payload Defect Indicator - Path codes comprise a working Payload Defect Indicator - Path code and a protect Payload Defect Indicator - Path code and said analysis comprises comparing said working Payload Defect Indicator - Path code and said protect Payload Defect Indicator - Path code to determine which of said working Payload Defect Indicator - Path code and said protect Payload Defect Indicator - Path code indicates a less defective path.

7 (Original). The method of providing equipment protection as in claim 5, further comprising a step of outputting a SONET signal comprising said working client payload.

8 (Previously Submitted). The method of claim 5, wherein the working switch fabric and the protect switch fabric are Wideband switch fabrics.

9 (Canceled). Please cancel claim 9.

10 (Currently Amended). The method of claim 5, wherein monitoring by each of said working and protect switch fabrics for equipment failures comprises monitoring for equipment failures that affects said switched payload.

11 (Currently Amended). The method of claim 10, wherein generating PDI-P codes by the switch fabric detecting an equipment failure to signal a presence of the equipment failure ~~providing PDI-P codes by the switch fabric detecting an equipment failure to signal a presence of~~

Serial No.: 10/743,592

Examiner: Ben H. Liu

~~the equipment failure~~ further comprises providing PDI-P codes to signal a quantity of affected path failures in said switched payload.

12 (Currently Amended). A cross-connect system comprising:

a working switch fabric coupled to a first and a second working switch interface, wherein the working switch fabric is configured operable to:

receive a working signal from the first working switch interface;

monitor for equipment failures that affect the working signal;

generate a working switched signal;

generate a working Payload Defect Indicator - Path (PDI-P) code in response to monitoring for equipment failures; and

providing the working switched signal with the working PDI-P code to the second working switch interface; and

a protect switch fabric coupled to a first and a second protect switch interface, wherein the protect switch fabric is configured operable to:

receive a protect signal from the first protect switch interface, wherein the protect signal includes same payloads as the working signal;

monitor for equipment failures that affect the protect signal;

generate a protect switched signal;

generate a protect Payload Defect Indicator - Path (PDI-P) code in response to monitoring for equipment failures; and

providing the protect switched signal with the protect PDI-P code to the second protect working-switch interface.

13 (Previously Presented). The cross-connect system of claim 12, wherein the working switched signal and the protect switched signal are selected based upon comparison of the working PDI-P code and the protect PDI-P code.

Serial No.: 10/743,592

Examiner: Ben H. Liu

Should the Examiner have any further comments or suggestions, please contact Jessica Smith at (972) 240-5324.

Respectfully submitted,

GARLICK, HARRISON & MARKISON

/Jessica Smith/

Jessica W. Smith

Reg. No. 39,884

Dated: May 18, 2009

Garlick, Harrison & Markison

P. O. Box 160727

Austin, TX 78716-0727

Phone: (972) 240-5324

Fax: (888) 456-7824